

FERRITE MATERIALS, METHODS OF PREPARING THE SAME, AND PRODUCTS FORMED THEREFROM

Abstract of the Disclosure

5 Ferrite materials, methods of forming the same, and products formed therefrom are disclosed, comprising, as main components, an iron oxide ranging from 55.5 to 58.0 mole percent calculated as Fe_2O_3 , an amount of manganese oxide ranging from 38.0 to 41.0 mole percent calculated as MnO , and an amount of zinc oxide ranging from 3.3 to 4.7 mole percent calculated as
10 ZnO . The present invention also includes, as minor components, an amount of calcium oxide ranging from 0.030 to 0.100 weight percent calculated as CaO , an amount of silicon oxide ranging from 0.015 to 0.040 weight percent calculated as SiO_2 , and an amount of niobium oxide ranging from 0.010 to 0.030 weight percent calculated as Nb_2O_5 .